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Docket No.: 2328-023RI

Serial No. 09/534,814

REMARKS

Applicant notes the allowance of claims 1-38 and the rejection of claims 39-58 as

containing new matter. Applicant also notes that the previous rejection of claims 39-58 as being

obvious as a result of Hama et al. has been dropped.

Applicant, in the last response and in the Declaration of Roger Patrick, has shown why

one of ordinary skill in the art would know from the drawing accompanying the parent

application, as filed, why the application as filed enables one of ordinary skill in the art to realize

that the application includes the subject matter defined by claims 39-58. In particular, Dr.

Patrick has testified that those of ordinary skill in the art in 1994 would have known the interior

portion of the coil illustrated in Figure 4 or 5 of the application (inside of circle B of Exhibit A

accompanying the Patrick Declaration) produces magnetic flux having greater density than is

produced by the intermediate portion of the coil, between circles A and B of Figures 4 and 5.

The greater flux density occurs in response to switch S1 of Figure 4 being open and switch S2 of

Figure 5 being connected to the outer terminal of coil portion 52. Dr. Patrick also testified that

those of ordinary skill would have known the exterior portion of the coil of Figure 4 or 5, beyond

circle A, produces magnetic flux having greater density than the intermediate portion under the

described conditions. He also testified that those of ordinary skill in the art would have known

the amount of magnetic flux produced by a particular coil arrangement is directly related to the

number of turns of the coil arrangement and the amount of current flowing through the coil. Dr.

Patrick also said those of ordinary skill in the art would have known that when the coils of

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Figures 4 and 5 are connected as described, the interior, intermediate and exterior portions of the

coils are connected in series so that the current which flows from a terminal at the interior of the

coil to a terminal at the exterior of the coil has only one path. Dr. Patrick also testified that those

of ordinary skill in the art would have known the interior and peripheral portions of the coil of

Figures 4 and 5 of the application, when connected as previously stated, includes (1) plural

radially and circumferentially extending turns and (2) that the intermediate portion of the coils of

Figures 4 and 5, between the interior and peripheral portions thereof, does not include a complete

turn and includes a lead having a straight portion. He also said those of ordinary skill would

have known the coils couple RF fields to the plasma and the coils produce RF magnetic fields, as

well as RF electric fields that are coupled from one portion of the coil into the plasma and back

to another portion of the coil. Dr. Patrick has given cogent reasons for his conclusions based on

the facts set forth in his Declaration.

The Examiner is reminded that an applicant may show possession of an invention by

disclosure of drawings that are sufficiently detailed to show the applicant was in possession of

the claimed invention as a whole. See MPEP Section 2163 and the decisions cited therein,

namely Vas-Cath Inc. v. Mahurkar, 935 F.2d at 1565, 19 U.S.P.Q. 2d at 118; In re

Wolfensperger 302 F.2d 950, 133 U.S.P.Q. 537 (CCPA 1962); Autogiro Company of America v.

United States, 384 F.2d 391,398, 155 U.S.P.Q. 697, 703 (Court of Claims 1967). The Vas-Cath

decision states: "Drawings alone may provide a 'written description' of an invention as required

by Section 112." The Wolfensperger decision says the drawings of applicant's specification

provided specific written descriptive support for the claim limitation at issue. The Autogiro case

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stated: "In those instances where a visual representation can flush out words, drawings may be

used in the same manner and with the same limitations as the specification." In the present case,

attorney for applicant and the Patrick Declaration have indicated how the drawings of the present

application provide a basis for the limitations of claims 39-58. The Examiner has not offered

any rebuttal evidence or comments with regard to these arguments and the evidence included in

the Patrick Declaration.

The Examiner argues that the coil specifics, such as the planar relation of one turn of the

coil to another and the spatial and planar locations of one coil portion to another have not been

disclosed. However, the claims do not recite a planar relationship between the coils. The

drawings provide a basis for the claimed subject matter, as discussed in the Patrick Declaration.

Attorney for applicant also notes that the claims say nothing about a more uniform etching result.

However, such a more uniform etching result is inherent in the claimed configuration.

In response to the Examiner's comments regarding the Hama et al. reference, applicant

notes that the coil in the Hama et al. reference is considerably different from the coil of the

present application. In the Hama et al. coil, the pitch of the coil is constant. Applicant has

demonstrated why the pitch of the coil of the present application is less in the intermediate

portion than in the peripheral and outer coil portions.

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In view of the foregoing Remarks, favorable consideration and allowance are respectfully requested and deemed in order.

Early issuance of a Notice of Allowance is courteously solicited.

The Examiner is invited to telephone the undersigned, Applicant's attorney of record, to facilitate advancement of the present application.

To the extent necessary, a petition for an extension of time under 37 C.F.R. 1.136 is hereby made. Please charge any shortage in fees due in connection with the filing of this paper, including extension of time fees, to Deposit Account 07-1337 and please credit any excess fees to such deposit account.

Respectfully submitted,

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Michael John

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